Appl. No. 10/787,501
Amdt. dated November 23, 2005
Reply to Office Action of August 22, 2005 and the Notice
of Non-Compliant Amendment mailed November 18, 2005

PATENT

REMARKS/ARGUMENTS

Claims 25-30 are pending. Claims 25-27, 29, and 30 have been amended. The specification has been amended to correct minor informalities. No new matter has been introduced. Applicant believes the claims comply with 35 U.S.C. § 112.

Applicant would like to the Examiner Jesse Diller and Supervisory Patent Examiner Donald Sparks for the courteous interview extended to Applicants' counsel, Chun-Pok Leung, and Applicants' representative, Tsuyoshi Aoyama, on October 20, 2005. During the interview, proposed claim amendments were discussed that would place the application in better condition for allowance. Independent claims 25 and 29 have been amended accordingly.

With regard to the objection of Figure 1, Applicant notes that while the system configuration is typical, the system as shown is not prior art. Although Figure 1 shows a typical system configuration, the implementation of the present invention, such as the security management program 103 in the disk array 109, distinguishes it over the prior art. Therefore, Applicant respectfully requests withdrawal of the objection of not labeling Figure 1 as prior art.

Claims 25-30 stand rejected under 35 U.S.C. § 102(a), (b), and (e) as being anticipated by Vahalia et al. (US 6,275,953).

Applicant respectfully submits that independent claim 25 is novel and patentable over Vahalia et al. because, for instance, Vahalia et al. does not teach or suggest that the storage system includes a LUN security function therein so that a predetermined host computer of the clustering system can access at least one of a plurality of logical units in the storage system, and changing access control information in the storage system, by the storage system using the LUN security function located therein, for disabling the primary host computer to access the at least one of a plurality of logical unit and enabling the secondary host computer to access the at least one of a plurality of logical units based upon a request for changing the access control information from the management computer.

Appl. No. 10/787,501
Amdt. dated November 23, 2005
Reply to Office Action of August 22, 2005 and the Notice
of Non-Compliant Amendment mailed November 18, 2005

PATENT

In the claimed invention, the LUN security function in the storage system controls access to the logical units in the storage system. See Fig. 2 and paragraphs [0022]-[0023] and [0032]. The storage system, using the LUN security function located therein, changes the access control information for disabling access and enabling access based on a request for changing the access control information from the management computer.

In Vahalia et al., the storage subsystem 23 includes file authorization and ownership 115. "The read-only cache of file authorization and ownership 107 caches file authorization and ownership information 115 stored in the cached disk storage subsystem 23. The file authorization information originates from a particular client that first created the file, although the file authorization information could be changed by the system administrator or another client having authority to change the file authorization information. The file ownership information includes an indication that a particular data mover owns the file, and this data mover ownership originates from the display and keyboard server 28." Column 15, lines 52-62. The authorization and ownership information 115 is merely information stored in the storage subsystem 23 relating to authorization and ownership. It is not an LUN security function that controls access to logical units in the storage subsystem. In Vahalia et al., the authentication module 104 for authenticating the client request and the authorization module 106 for authorizing the requested file access reside in the data mover 101. Therefore, the storage subsystem 23 contains no LUN security function, and does not change access control information for disabling access and enabling access based on a request.

For at least the foregoing reasons, claim 25 and claims 26-28 depending therefrom are novel and patentable over Vahalia et al.

Applicant respectfully submits that independent claim 29 is novel and patentable over Vahalia et al. because, for instance, Vahalia et al. does not teach or suggest that the storage system includes a LUN security function therein so that a predetermined host computer of the plurality of host computers which include the primary host computer and the secondary host computer can access at least one of a plurality of logical units in the storage system, and changing the access control, by the storage system using the LUN security function located therein, so that the storage system permits access to the logical unit from the

Appl. No. 10/787,501
Amdt. dated November 23, 2005
Reply to Office Action of August 22, 2005 and the Notice
of Non-Compliant Amendment mailed November 18, 2005

PATENT

secondary host computer based upon a request from the management computer when the secondary host computer takes over processing of the primary host computer.

As discussed above, the authentication module 104 for authenticating the client request and the authorization module 106 for authorizing the requested file access reside in the data mover 101 in Vahalia et al. Therefore, the storage subsystem 23 contains no LUN security function, and does not change access control to permit access based on a request.
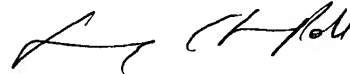
For at least the foregoing reasons, claim 29 and claim 30 depending therefrom are novel and patentable over Vahalia et al.

CONCLUSION

In view of the foregoing, Applicant believes all claims now pending in this Application are in condition for allowance. The issuance of a formal Notice of Allowance at an early date is respectfully requested.

If the Examiner believes a telephone conference would expedite prosecution of this application, please telephone the undersigned at 650-326-2400.

Respectfully submitted,

Chun-Pok Leung
Reg. No. 41,405

TOWNSEND and TOWNSEND and CREW LLP
Two Embarcadero Center, Eighth Floor
San Francisco, California 94111-3834
Tel: 650-326-2400
Fax: 415-576-0300
RL:rl
60642804 v1